## **Book Reviews**

GRAND ROUNDS—ONE HUNDRED YEARS OF INTERNAL MEDICINE—Edited by Russell C. Maulitz, Staff Physician, Presbyterian—University of Pennsylvania Medical Center, and Lecturer in History and Sociology of Science in Medicine, University of Pennsylvania School of Medicine, and Diana E. Long, Director of the Francis C. Wood Institute of the College of Physicians and Adjunct Associate Professor, University of Pennsylvania, Philadelphia. University of Pennsylvania Press, Bockley Hall, 13th Floor, 418 Service Dr, Philadelphia, PA 19104, 1988. 367 pages, \$34.95.

This volume is a compilation of conference papers generated in March 1986 for the second national conference at the Francis C. Wood Institute for the History of Medicine. Established in 1978, the Wood Institute of the Philadelphia College of Physicians held its first annual conference on the history of the American general hospital in 1984. This work honors Francis C. Wood and provides a scholarly chronicle and analysis of the emergence of internal medicine as a professional specialty during the past century.

According to Institute director and editor Diana E. Long, Wood's own professional life reflected the "remarkable transformation of American medicine" from the second decade of the 20th century to the present. Wood was a pathbreaker in the development of the subspecialty of cardiology. His career provides the model for the other subspecialties explicated in this text. He published over 50 papers encompassing numerous aspects of cardiovascular problems and assumed leadership of the elite medical scientific societies. World War II was a central event in the vast expansion of the American medical and scientific establishment. As Chief of Medicine at the 20th General Hospital in Assam, India, where the mortality rate was less than 1%, Wood's activities paralleled this expansion. In the postwar era he was an organizational leader who seized the opportunity of the enormous infusion of federal funds and emergence of large-scale institutions to enlarge activities in his own medical community.

Building on the Wood profile, the contributors to Grand Rounds describe aspects of the professionalization and specialization of internal medicine and five of its eleven subspecialties. Three introductory chapters by Russell C. Maulitz, Maulitz and Paul B. Beeson, and W. Bruce Fye, set forth the larger interpretive framework for the five subspecialty case studies that form the core of the collection.

In "The Inner History of Internal Medicine," Maulitz and Beeson assess its strengths and weaknesses as a specialty. They review benchmarks in its development with a focus on the post-World War II period. After 1950 and the great leap in research funding, the specialty fractured into a wide plurality of subspecialties. They argue that the explosion of knowledge and geometric growth of the subspecialty rendered it without clear boundaries and definition. Ironically, however, this structural ambiguity had positive social benefit. Internal medicine's broad contours have enabled it to transcend the narrow focus of other specialties organized around a particular organ system and technology. Its practitioners view human health and disease from a holistic perspective and better apply the principles of comprehensive care

Cardiology formally became a subspecialty of internal medicine in 1940, when the new American Board of Internal Medicine voted certification of internists in allergy, gastroenterology, and both pulmonary and cardiovascular disease. Joel D. Howell's "Heart and Minds: The Invention and Transformation of American Cardiology" is a particularly compelling case study of this process for the historian because the author provides a rich historical context for the formative medical events.

The four other case studies only occasionally miss the high stylistic mark of Howell's narrative. Edward H. Kass discusses infectious diseases, Joseph B. Kirsner explores gastroenterology, Thomas G. Benedek reviews a century of rheumatology, and Steven J. Peitzman assesses developments in nephrology from Thomas Addis to the artificial kidney. At times a rigid structure in these chapters, perhaps imposed by the editors, tends to inhibit the natural flow of discussion into a stilted chronicle of professional literature and associationalism. Nevertheless, the publication is an important interdisciplinary contribution to the history of medicine and an effective means of disseminating the vital gathering of knowledge in academic centers for historical studies in the health sciences.

Rosemary Stevens concludes the collection with a succinct elaboration of the themes introduced by Maulitz and Beeson. She pinpoints the central paradox of internal medicine as a specialty. Because of its ambiguous definition and fragmentation into so many major subspecialties, it exists only because its practitioners are organized into highly regarded professional societies and publish professional journals. Ironically, this very ambiguity is also the specialty's greatest strength. By the middle 1980s, about a fourth of all United States resident physicians were in approved internal medicine programs, and the American Board of Internal Medicine granted almost 40% of all primary specialty certificates. Internal medicine has become a "self-defined conscience for medicine"; its practitioners view the human body as a whole and as an interactive part of its physical environment.

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DIAGNOSTIC NUCLEAR MEDICINE—Second Edition—2 volumes—Edited by Alexander Gottschalk, MD, Professor and Chairman, and Paul B. Hoffer, MD, Professor and Chief of Nuclear Medicine, Department of Diag-Horner, MD, Professor and Chief of Nuclear Medicine, Department of Dag-nostic Radiology, Yale University School of Medicine, New Haven, Connect-icut, and E. James Potchen, MD, Chairman, Department of Radiology, Mich-igan State University, East Lansing. Williams & Wilkins, 428 E Preston St, Baltimore, MD 21202, 1988. 1,154 pages, \$215.

This very well-organized two volume reference work (formerly known as Golden's Diagnostic Radiology) reappears on the nuclear medicine literature scene in timely fashion. After a short plateau, this field is again blossoming rapidly, and a well-produced compendium of this nature is welcome. As with all textbooks in dynamic fields, some of the latest coverage is, of necessity, curtailed, but even that slight shortcoming is minimal.

There are 75 chapters in 17 sections that cover a broad scope, including the history of the discipline, physics and instrumentation, radiation protection and dosimetry, radiopharmaceuticals, and methods of data interpretation. There are 125 contributors, well-known in the field. The broad spectrum of areas amenable to radionuclide investigation and therapy is showcased in this work. In addition to the more common areas of heart, lung, bone, renal, and oncologic disease, the volumes cover well those of hematology, gastroenterology, vascular studies, endocrinology, pediatrics, infection, and trauma. Indeed, sections on radioimmunoassay and radioactive iodine therapy are excellent updates. Neurology, a field for years relinquished to the province of computerized tomography and magnetic resonance imaging, has been more recently reopened to nuclear medicine, and this new information is included.

The text is well-written and avoids some of the hyperbole and convolution frequently found in ambitious survey textbooks. The illustrations are good, and the index is as adequate as can be expected in this type of work, with references dating even up to a year before publication. As another reviewer has suggested, the color plates for cardiology and neurology studies could perhaps have been placed other than at the beginning of the book with the table of contents, but considering the stature of the editors, this too was probably the result of careful consideration. Very little is omitted, although one might expect even seldom employed techniques such as salivary gland imaging to be included in a comprehensive textbook. Printing errors are virtually nonexistent.

In summary, this two-volume textbook deserves a place in the library of any physician or facility involved in the practice of nuclear medicine. It is of the highest quality and certainly sets a new standard for a complete reference source in this field.

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